USFWS TLIP 2004 Lummi Natural Resources

Tribal Landowner Incentive Program Grant Application FY 2004 Lummi Nation Natural Resources Department

I Program Summary

Lummi Natural Resources seeks funding for project activities in support of salmon recovery in the Nooksack River basin: *Acme-Saxon Phase I Project*.

Project Activity 1. In-stream Structures

Preliminary limiting factors analysis conducted for the Water Resources Inventory 1 (WRIA 1) Salmon Habitat Restoration Strategy indicates that the loss of holding pools associated with large woody debris concentrations in the middle reaches of the Soth Fork Nooksack is a <u>primary limiting factor for the threatened South Fork chinook</u> and other salmonid species. The Salmon Habitat Restoration strategy also lists lack of habitat diversity and elevated water temperatures as limiting factors. This proposal will fund 2 of 10 historic scale logjams to be constructed in the South Fork in Summer 2005. These logjams will be patterned after those built in the Larson's Bridge Historic Scale Logjam Project (2001).

The logjams will provide deep sheltered pools and help restore an anastomozed channel configuration to provide multiple channels around stable forested islands. This will address WRIA 1 Restoration priorities to restore habitat complexity, channel stability and water quality for chinook salmon, bull trout, coho and other salmonid stocks. The project is based on "Preferred Alternative" prescriptions developed in the Acme-Saxon Alternatives Analysis. The logjams will function in concert with floodplain levee modifications made in a sister project.

Final design and permitting will be completed in winter 2004. Project materials will be pre-purchased and staged prior to construction. It will consist of trees obtained from land clearing activities outside of riparian areas. The pieces will be from 30-48 inches in diameter and sixty feet long with large root structures attached.

Project Activity 2. Riparian Restoration

The preliminary limiting factors analysis in the WRIA 1 Salmon Habitat Recovery Strategy also identified the South Fork as being limiting in habitat diversity, complexity and elevated water temperatures. Riparian stand restoration not only addresses the above noted habitat deficits, but also develops the large woody debris needed to replace our historic scale logjams as they naturally degrade over time. We propose to restore riparian conifer content in winter 2005 to 7 acres buffering the South Fork. This work will contribute to 110 acres of previously completed riparian work in the reach.